

46—710 Removal and installation of power steering pump

Data

Part no.	Opening pressure of vacuum valve in bar gauge pressure	Color code of information plate
116 460 20 80 116 460 17 80	65	black

Oil grades/filling capacities and oil level checkup

Automatic transmission fluid (ATF) or manual transmission oil	refer to Specifications for Service Products page 236.2 refer to Specifications for Service Products page 237
--	--

Filling capacity	approx. 1.4 litres
------------------	--------------------

Oil level checkup	With the oil at operating temperature (approx. 80 °C) the oil level in supply tank should reach up to cast-in mark (approx. 20 mm below edge of tank). With the engine cold and at ambient temperature, oil level 6—8 mm below mark. For filling up, use perfectly clean oil only, since even the smallest particles of dirt may cause trouble in hydraulic system.
-------------------	---

Tightening torques	Nm	
Hex. nut to drive shaft	50	
Cap screw of HP expanding hose	45—50	
Cap screw of connecting pipe (return flow)	45—50	
Hex. screws for attaching pump in carrier M 8	8.8	25
	10.9	35

Special tool

Puller for pulley on drive shaft
of power steering pump

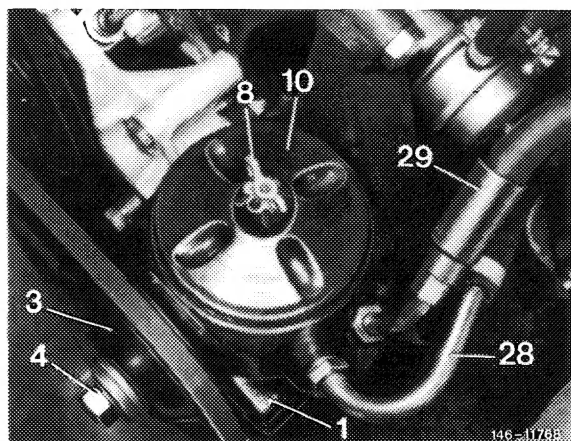


108 589 02 33 00

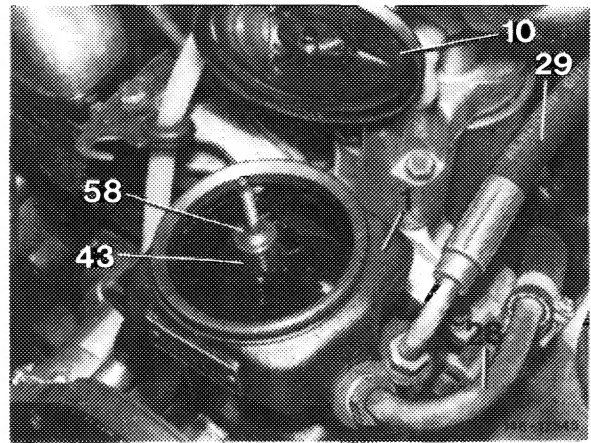
Removal

All models

- 1 Unscrew wing or knurled nut from pump housing and remove closing cover.

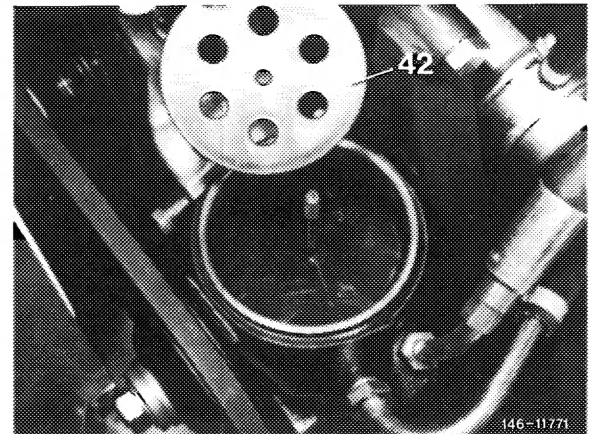


- 2 Remove locking spring (58) and compression spring (43) from stud.

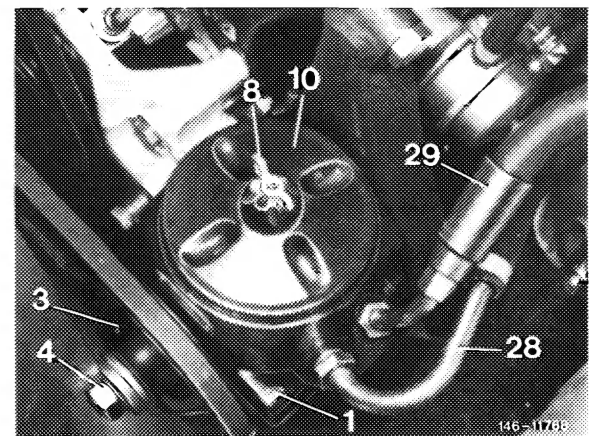


- 3 Remove upper damping plate.

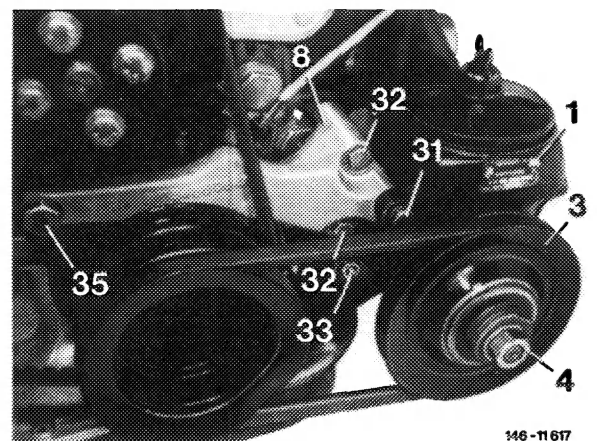
- 4 Draw oil from supply tank with a syringe.



- 5 Loosen high-pressure expanding hose (29) and elbow (28) for return hose on powersteering pump.

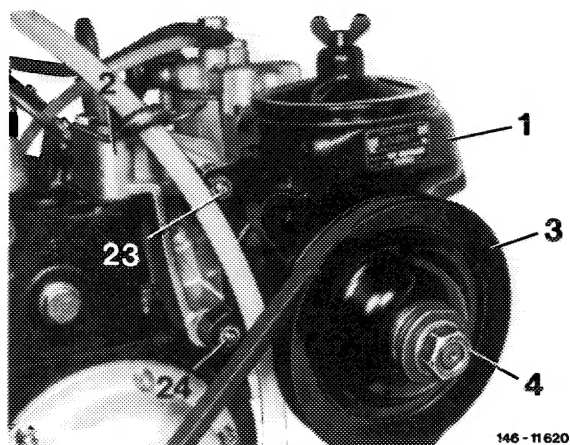


- 6 Loosen hex nut (4) on input shaft while holding pulley and flat profile.



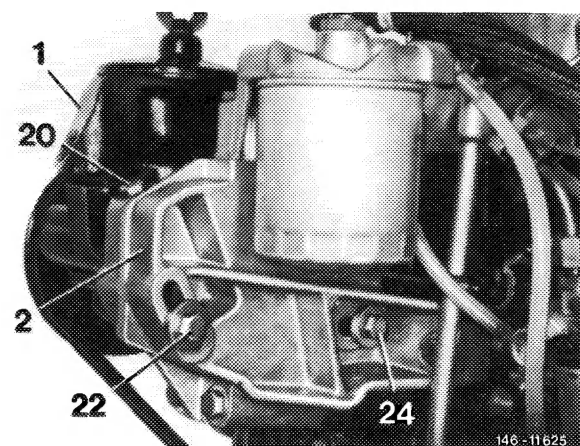
Model 123.1

- 7 Loosen hex screws or hex nuts (23) and (24).

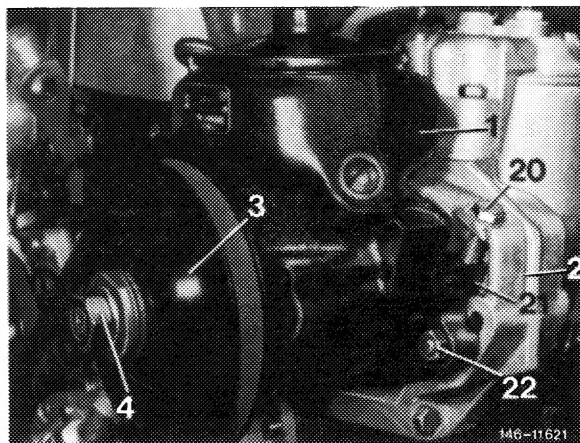


- 8 Loosen hex screw (22), then turn tensioning screw (20) to the left and relax V-belt, remove V-belt.

- 9 Unscrew all hex screws, while paying attention to washers under hex screws (22), (23) and (24).

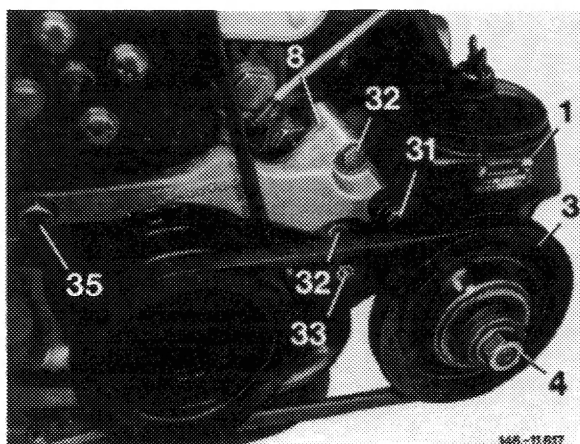


- 10 Remove powersteering pump while paying attention to tensioning piece (21).



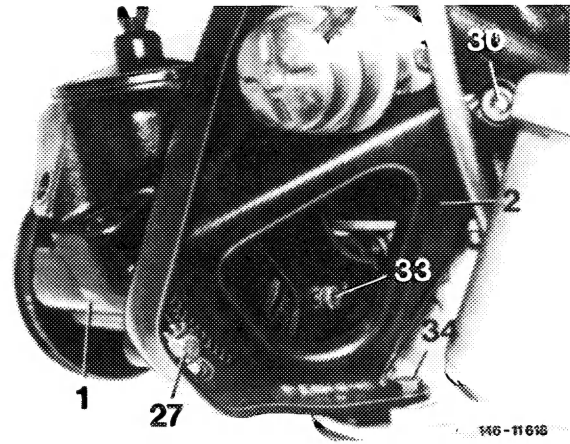
Models 123.020, 123.023

- 11 Loosen hex screw or hex nuts (31 and 33).



12 Loosen hex. nut on gear wheel (27), then slacken V-belt by turning gear. Remove V-belt from pulley.

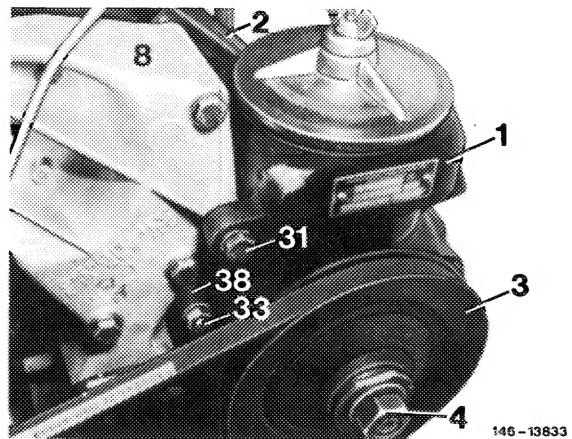
13 Unscrew all hex. screws or hex. nuts and remove power steering pump.



Model 123.023 (USA) 1977

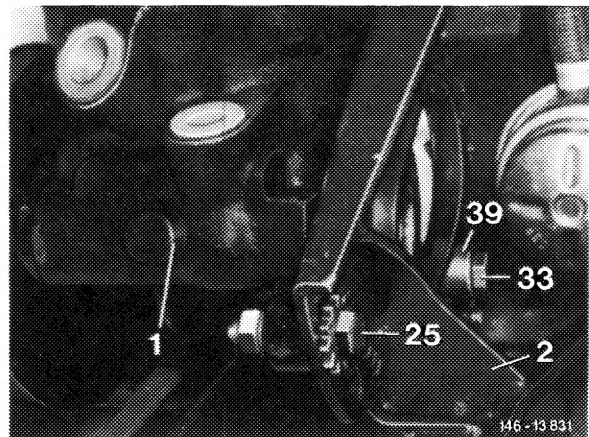
14 Loosen hex. nut (33) and remove bushing (38).

15 Loosen hex. screw (31).



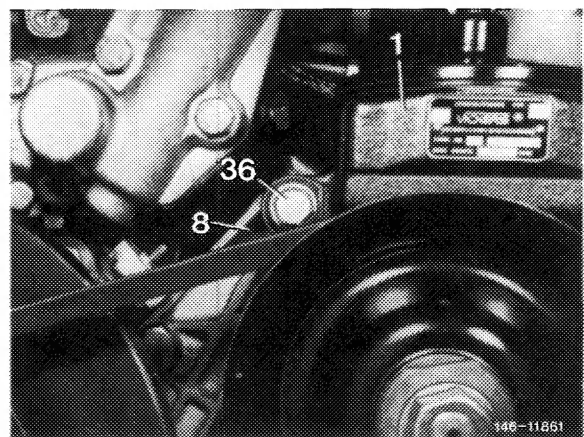
16 Loosen hex. nut on gear wheel (25), then slacken V-belt by turning gear. Remove V-belt from pulley.

17 Remove hex. screw (33) including bushing (39). Unscrew all other hex. screws or hex. nuts and remove power steering pump.



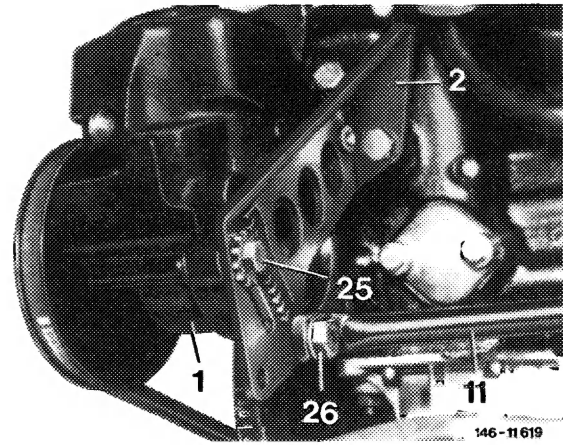
Models 123.026, 123.03

18 Loosen hex. screw (36).



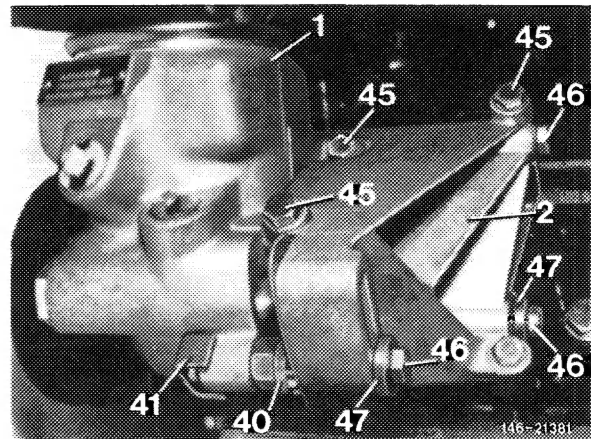
19 Loosen hex. nut on gear wheel (25), then slacken V-belt by turning gear. Remove V-belt from pulley.

20 Unscrew hex. screw and hex. nut and remove power steering pump.

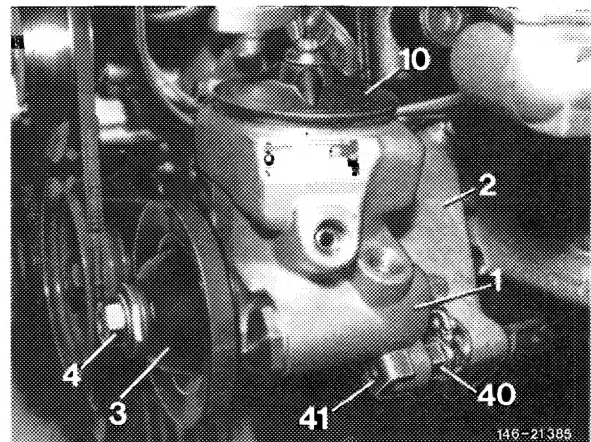


Model 123.2

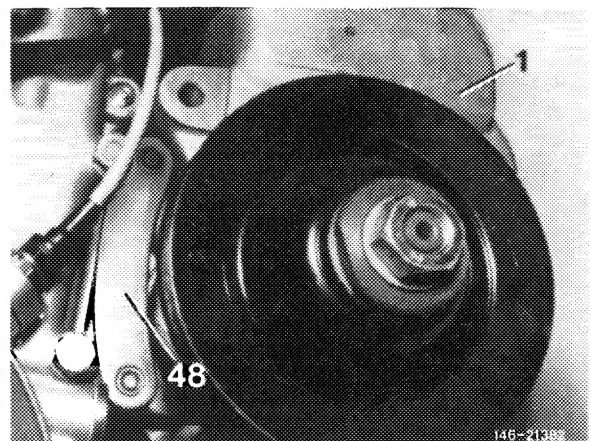
21 Loosen hex. screws (46). Slacken V-belt with gear wheel (40) and remove V-belt.



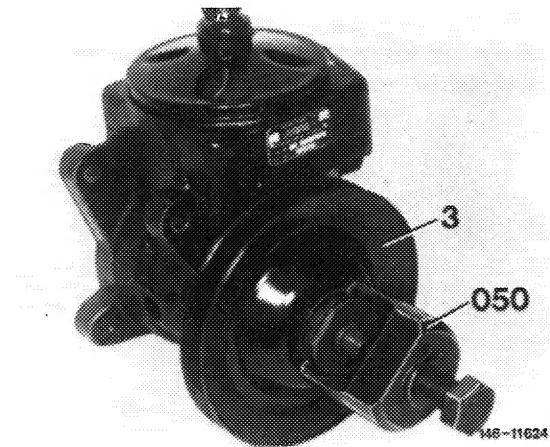
22 Unscrew hex. screw (46) from holder (41). Remove holder.



23 Unscrew hex. screws (46) from holder (48). Remove power steering pump including holder.



24 Unscrew hex. nut from drive shaft and pull off pulley by means of puller.

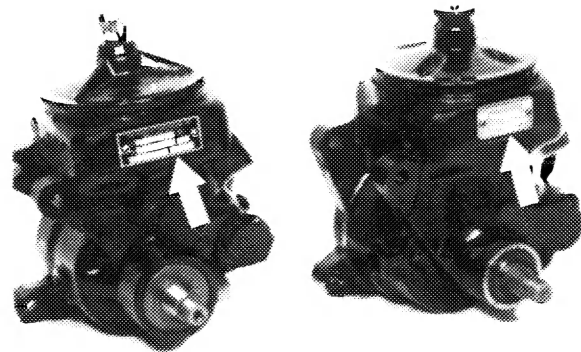


Installation

All models

Note: Make sure that only a power steering pump with 65 bar opening pressure of pressure relief valve is installed. The opening pressure is punched into information plate of pump, the information plate has additionally a black basic color.

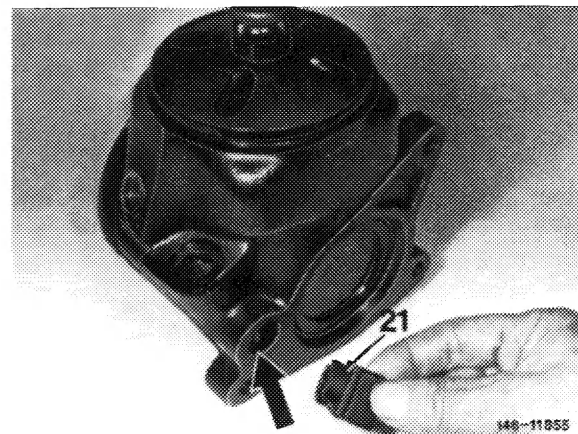
25 Attach pulley to drive shaft. Apply counterhold for pulley at two-point flats.



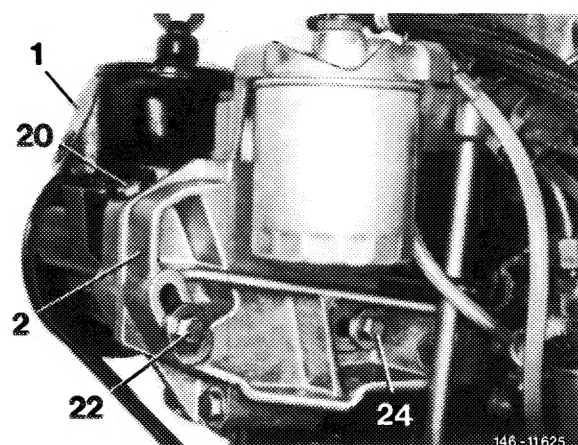
Note: The pulley on vehicles with diesel engine has been modified starting February 1979 and starting September 1980. If the pulley must be replaced, make sure that the pertinent version is again installed.

Model 123.1

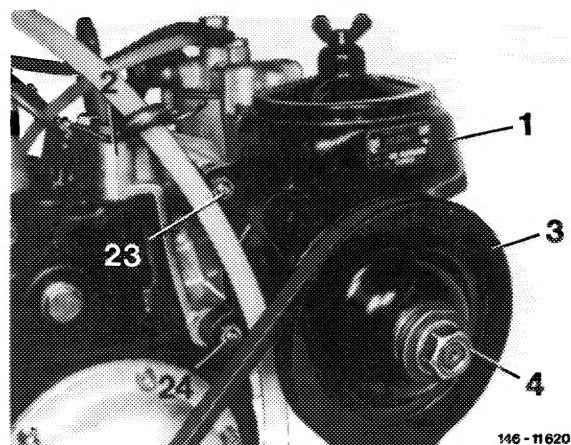
26 Insert clamping piece with cut threads in upward direction into blind hole of power steering pump.



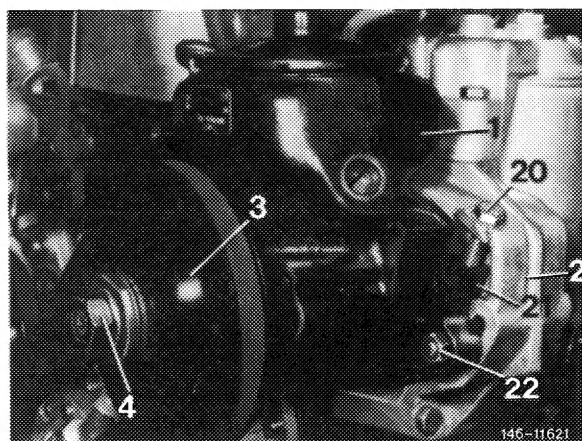
27 Insert power steering pump into carrier, screw hex. screw (20) into clamping piece. Attach pump with hex. bolts (22) and (24), but do not yet tighten hex. nuts.



28 Attach power steering pump with hex. bolt (23) to carrier (do not forget 5 mm washer), but do not yet tighten hex. nuts.



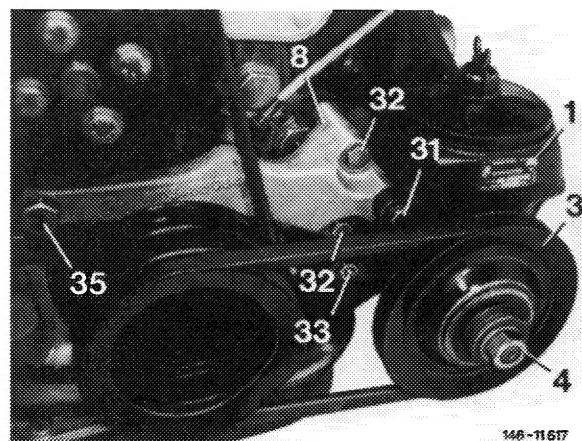
29 Mount V-belt and tension with hex. screw (20). Then tighten all hex. bolts and hex. nuts.



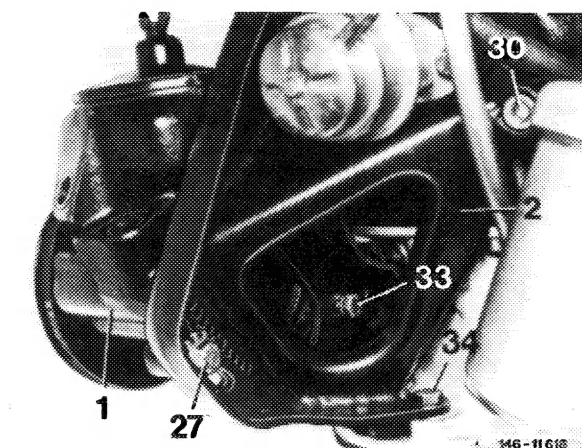
Models 123.020, 123.023

30 Attach power steering pump to bracket (8) and carrier with hex. bolts (31) and (33), but do not yet tighten screws (bolts) or hex. nut.

Note: Tighten hex. bolt (31) of grade 10.9 to 35 Nm.

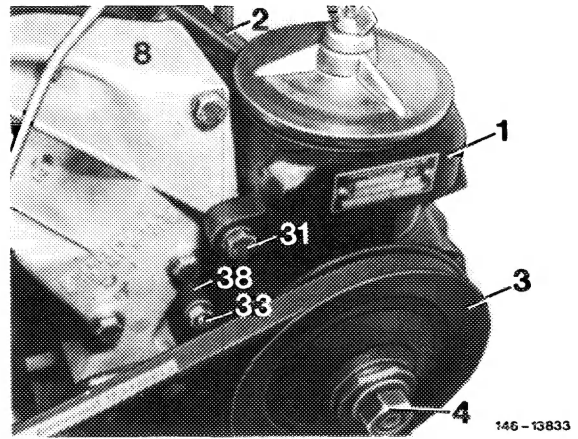


31 Screw hex. nut on gear wheel (27), mount V-belt and tension belt with gear wheel. Then tighten all hex. nuts and bolts.



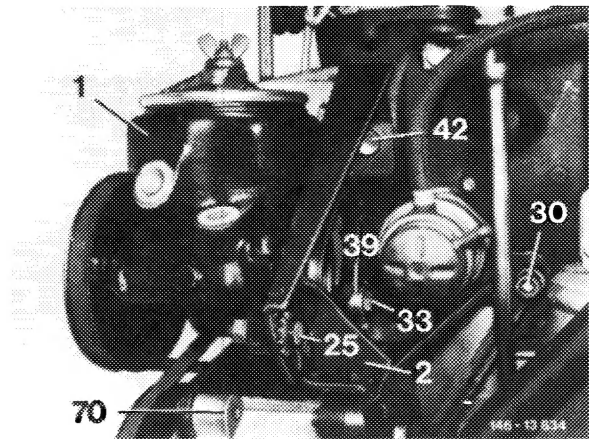
Model 123.023 (USA) 1977

32 Attach power steering pump to bracket (8) and carrier with hex. bolt (31).



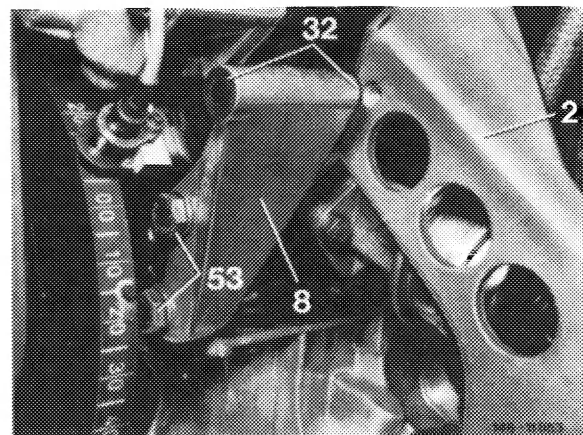
33 Insert hex. bolt (33) with bushing (39) into carrier and power steering pump. Mount bushing (38) and screw-on hex. nut.

34 Screw hex. nut on gear wheel (25), mount V-belt and tension V-belt with gear wheel. Then tighten all hex. bolts and hex. nuts.

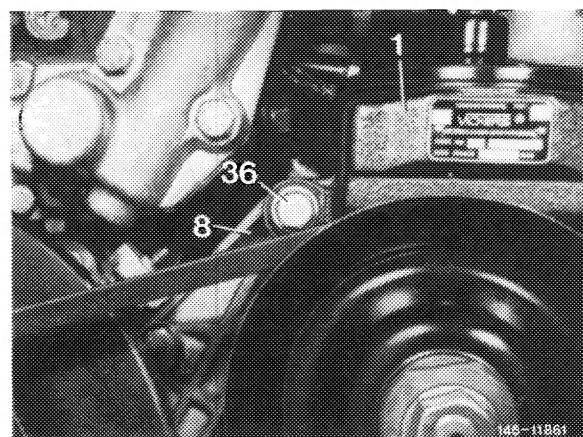


Models 123.026, 123.03

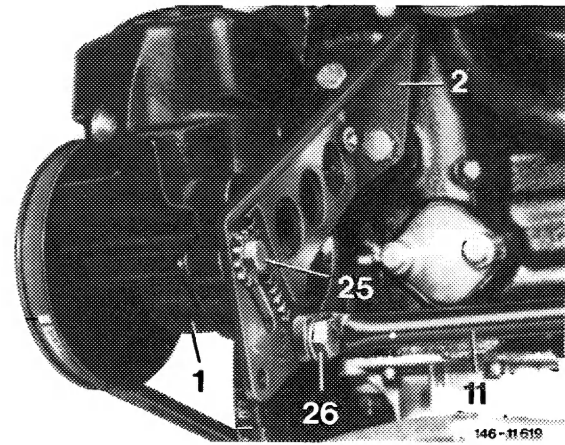
35 Check plastic bushings (32) in holder, replace bushings, if required.



36 Attach pump in holder (8) or carrier with hex. screw (36), but do not yet tighten.

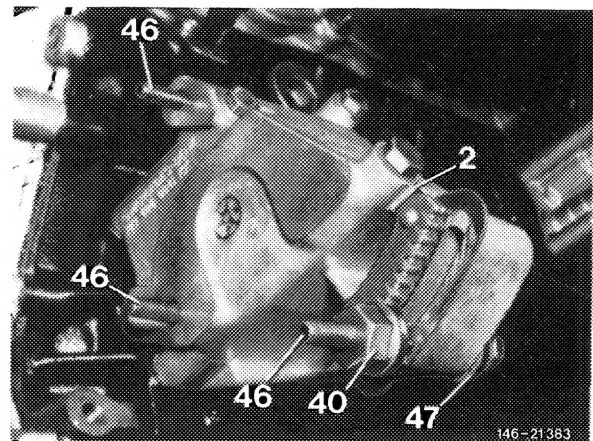


37 Screw hex nuts on gear wheel (25). Place V-belt on pulley. Tension pulley with gear wheel. Tighten hex. bolt and hex. nut on gear wheel.

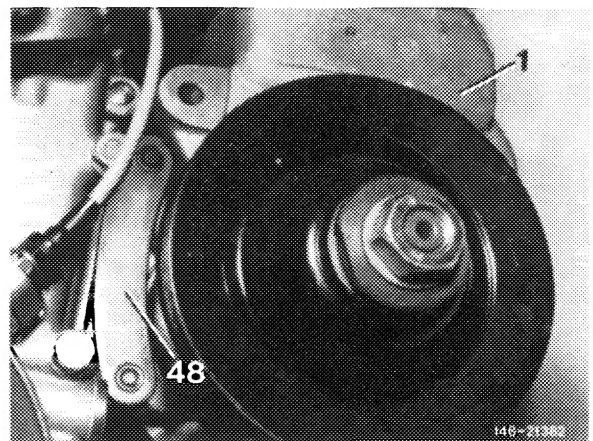


Model 123.2

38 Insert hex. screws (46) including washers (47) into mounting bracket (2). Place gear wheel (40) on hex. head screw.

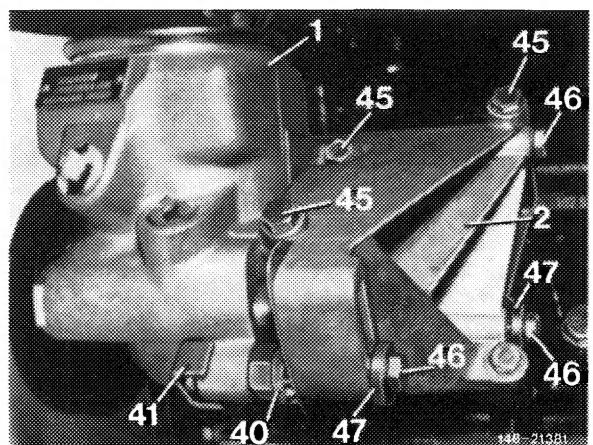


39 Insert power steering pump in mounting bracket, screw both hex. head screws into holder (48).



40 Screw hex. head screw (46) into holder (41).

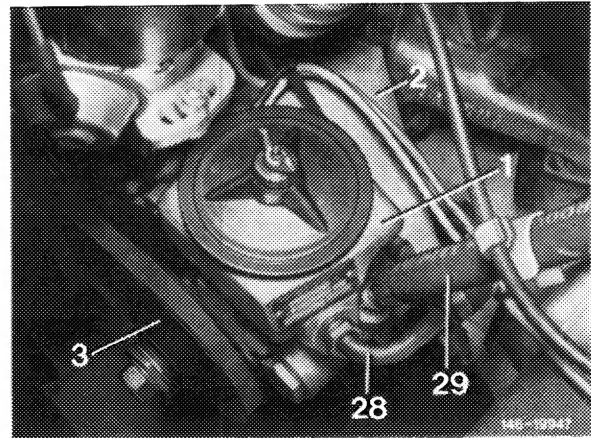
41 Mount V-belt and tension with gear wheel (40). Then tighten all hex. head screws.



All models

42 Connect HP expanding hose and return flow hose to pump housing. Make sure of perfect installation of hose.

43 Fill power system with specified oil, add oil up to mark with engine running.



44 Turn steering completely to the left and right to bleed system.

45 Check oil level and power system for leaks.